

Part Number: 8240

Distributed Antenna Systems (DAS) 52 Ohm, RG58, 20 AWG, CMX



Product Description

Distributed Antenna Systems (DAS) Cable, RG-58A/U type, 20 AWG solid .033" bare copper conductor, polyethylene insulation, tinned copper braid shield (95% coverage), PVC jacket.

Technical Specifications

Product Overview

Environmental Space:	Outdoor - Aerial
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Physical Characteristics (Overall)

Conductor

AWG	Stranding	Material	Nominal Diameter	No. of Coax
20	Solid	BC - Bare Copper	0.033 in	1

Conductor Count:	1
Conductor Size:	20 AWG

Insulation

Material	Nominal Diameter
PE - Polyethylene	0.116 in

Outer Shield Material

Type	Material	Coverage [%]
Braid	TC - Tinned Copper	95 %

Outer Jacket Material

Material	Nominal Diameter
PVC - Polyvinyl Chloride	0.193 in

Electrical Characteristics

Conductor DCR

Nominal Conductor DCR	Nominal Outer Shield DCR
10 Ohm/1000ft	4.1 Ohm/1000ft

Capacitance

Nom. Capacitance Conductor to Shield
28.5 pF/ft

Inductance

Nominal Inductance
0.08 μ H/ft

Impedance

Nominal Characteristic Impedance
52 Ohm

High Frequency (Nominal/Typical)

Frequency [MHz]	Nom. Insertion Loss
1 MHz	0.3 dB/100ft
10 MHz	1.1 dB/100ft
50 MHz	2.5 dB/100ft
100 MHz	3.8 dB/100ft
200 MHz	5.6 dB/100ft
400 MHz	8.4 dB/100ft
700 MHz	11.7 dB/100ft
900 MHz	13.7 dB/100ft
1000 MHz	14.5 dB/100ft

Delay

Nominal Delay	Nominal Velocity of Propagation (VP) [%]
1.54 ns/ft	66 %

Power Rating

Frequency [MHz]	Max. Power Rating [W]
50 MHz	530 W
100 MHz	350 W
400 MHz	160 W
1,000 MHz	90 W

Voltage

Non-UL Voltage Rating	UL Voltage Rating
1400 V RMS	300 V RMS (CMX), 30 V RMS (UL AWM Style 1354)
	30 V RMS (UL AWM Style 1354)

Electrical Characteristics Notes: Actual Impedance specification is 51.5 +/- 1.5 ohms.

Temperature Range

UL Temp Rating:	80°C (UL AWM Style 1354)
Operating Temp Range:	-40°C To +75°C

Mechanical Characteristics

UV Resistance:	Yes
Bulk Cable Weight:	26 lbs/1000ft
Max Recommended Pulling Tension:	47 lbs
Min Bend Radius/Minor Axis:	2 in

Standards

NEC/(UL) Specification:	CMX
CEC/C(UL) Specification:	CMX
UL AWM Style:	UL Style 1354
CPR Euroclass:	Eca
RG Type:	58A/U Type

Applicable Environmental and Other Programs

EU Directive 2000/53/EC (ELV):	Yes
EU Directive 2003/96/EC (BFR):	Yes
EU Directive 2011/65/EU (ROHS II):	Yes
EU Directive 2012/19/EU (WEEE):	Yes
EU Directive Compliance:	EU Directive 2003/11/EC (BFR)
EU CE Mark:	No
EU RoHS Compliance Date (yyyy-mm-dd):	2004-01-01
CA Prop 65 (CJ for Wire & Cable):	Yes
MII Order #39 (China RoHS):	Yes

Suitability

Suitability - Aerial:	Yes - Black only, when supported by messenger wire
Suitability - Burial:	No
Suitability - Hazardous Locations:	No

Suitability - Indoor:	Yes
Suitability - Outdoor:	Yes - Black only

Flammability, LSOH, Toxicity Testing

UL Flammability:	VW-1
UL voltage rating:	300 V RMS (CMX), 30 V RMS (UL AWM Style 1354)

Plenum/Non-Plenum

Plenum (Y/N):	No
Plenum Number:	88240, 82240

Part Number

Variants

Item #	Color	Footnote
8240 010100	Black	
8240 0101000	Black	C
8240 010500	Black	C
8240 0105000	Black	C
8240 010U1000	Black	
8240 010U500	Black	

Footnote:	C - CRATE REEL PUT-UP.
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